



SUBSTITUTE SPECIFICATION-CLEAN COPY

INFORMATION SYSTEM PROVIDING REQUESTED AND ADVERTISING  
INFORMATION

BACKGROUND OF THE INVENTION

1. Field of the Invention

The present invention pertains to the field of information systems, inquiry and information devices and/or systems providing information to a user according to his request and in which an advertising set can be integrated.

2. The Prior Art

There is a well-known system for providing an advertising information containing an ultrasonic transmitter installed in a shop, directed to the area where a potential customer might be. Any moving object within the area of coverage of the receiver reflecting ultrasonic waves of the transmitter causes change in the ultrasonic receiver condition. The monitor connected to said receiver selects the signal indicating change in the ultrasonic receiver condition by means of the comparator, turns on the videocassette player to play on the TV or Display screen a videotape containing advertising (GB 2146821 A, GO9 F 27/00, 24.04.85). There are analogous well-

known audio-visual systems registering appearance of a potential user of advertising and including audio-visual devices containing advertising information (EP 0421941 A, G09 F 27/00, 10.04.91, GB 2270585 A, G09 F 27/00, 16.03.94).

At present demonstration of advertising is also provided through telecommunication networks, for instance through the Internet (Honicatt Jarry, Internet, second edition, Kiev-Moscow, Dialektika, p.20-24, fig. 1.1), where the USA Today Web-page is available containing all indispensable news updated within the day; and where it is visible that Microsoft Corp. is one of many sponsors maintaining Yahoo (see the same, fig. 1.2). However, in said source there are no technical means for implementing this land of advertising.

The closest to the proposed in its technical entity is the information system intended for transmitting the information requested by its user as well as advertising information, including at least one user's device for storing information (see EP 0337539 A2, G09 F 27/00, 18.10.89), the indicated memory device (mem) also stores advertising information.

The well-known system is intended for transmitting the information requested by the user, stored in the memory device alongside with the advertising message.

The system includes many points for providing visual

information. The user's device is implemented as a telephone and connected to an information-mapping device implemented as a monitor screen and so on.

The user requires the information he is interested in on the phone, the computer converts the user's inquiry into the information retrieval signal, which is sent from the memory device to the screen. The items for providing information (distributors) may also be connected to the communication network to increase and to provide periodical data refresh through computer devices.

The disadvantage of this system is that said items for providing information are situated in a specific location, whereas it is convenient to situate the user's device, for instance, at home, at the office, etc.

In the well-known information system information and advertising message are transmitted from the above mentioned memory device only in one information providing mode whereas it is sometimes necessary to change the mode for providing a requested information as well as the advertising message, that is, for instance, to transmit either a piece of information message then a piece of advertising message, or the whole advertising, or to provide the information and advertising simultaneously. Moreover, in the system the choice of

advertising type, for instance, according to the user's request is not available, that is in the well-known systems advertising is dictated.

#### **SUMMARY OF THE INVENTION**

The purpose of this invention is to increase the functional capacities of the system as well as the number of technical means used for providing the requested information as well as advertising.

This system allows to use the above-mentioned means in any convenient location and not in specific locations such as at home, at work or on the road using various communication networks, the system allows information to be provided according to any mode suitable for it, or enables the user to select the type of advertising information he is interested in. This system can further provide a portion of the information and/or a portion of the advertising to various sequences, and is further capable of providing information and advertising simultaneously, which is convenient for the user. This system can further provide information in a visual form, as acoustic information or in a printed form. As the system here can be used a telecommunication network, the Internet network, that is the global network, as well as ordinary inquiry information display boards installed in common places. The introduction of

advertising information into the information set will further allow to get extra financial means for development of inquiry information systems and to improve the quality of the information, provided by the network.

The said purpose is achieved by that this information system including at least one user's device connected via a connection unit to a memory device for storing information includes a device for generating a set of requested information as well as advertising information wherein said device is connected to the memory device for storing information and to the connection unit and comprises an entry for inputting the advertising information, the advertising information memory device is connected to said entry of the above-mentioned device for generating, which can be implemented on the microprocessor, and the above-mentioned device for generating is implemented with a possibility to change the consequence of providing the requested information and/or advertising information.

Also said device for generating may be implemented with a possibility to provide video display of the requested and/or advertising information.

The indicated device for generating may also be implemented to allow simultaneous video display of the requested information and advertising information.

The above indicated device for generating may also be implemented to allow visual requested information and audio advertising information providing.

Furthermore, said device for generating may be implemented to allow requested information printing.

Furthermore, the user's device may be implemented as either a personal computer or telephone, or video telephone, or radiotelephone.

Furthermore, the system allows implementing a user's device as a remote control.

In this case the device for generating a set of requested and advertising information is implemented as an information display board.

The connection unit may be implemented as multiplexer, or connection network, or telecommunication network.

In this case a connection network may be a telephone network, for instance, a cellular telephone network or the wide area network.

The Internet network may represent a telecommunication network.

The device for generating a set of requested and advertising information may be implemented so that to allow a choice of advertising information types.

The memory device for storing information may be implemented as a server, if networks (telecommunication, wide area network, Internet) are used as a connection unit.

#### **BRIEF DESCRIPTION OF THE DRAWINGS**

Fig.1 shows an example of a system functional scheme, Fig.2 shows required and advertising information being arranged simultaneously on the user's device display screen, Fig.3 shows an example of the system implementation as an inquiry information display board.

#### **DETAILED DESCRIPTION OF PREFERRED EMBODIMENTS**

The present system shown on Fig.1 includes user's devices 1 implemented, for instance, as a personal computer. There may be a lot of said devices, that is, for instance, in case if a personal computer has an access to a communication network, telephone network, telecommunication network of the Internet type and so on. The user's device may be represented by telephone, video telephone or remote control. The user's devices 1 are intended for forming a request according to the information the user is interested in. They may be implemented in order to allow information display, for instance, on a user's personal computer display screen and so on. Said user's devices 1 are connected to the connection

unit 2. Said connection unit 2 may be, as it is mentioned above, implemented as a communication network, telephone network, wide area network e.t.c. Said unit, in case if the system is represented by an information board (Fig.2) may be represented by an ordinary multiplexer (bank switching), which according to command signals, input from the user's device 1 control panel, outputs information on to the device board 3 for generating a set of requested and advertising information.

Connection unit 2 as shown on Fig.1 is intended for connection through well-known means or lines of communication of the user and the memory device 4 for storing information (mem), which stores requested information but also allows to store information of any kind and of different purpose of data base.

In case of implementation of the present system on the basis of telecommunication networks, mem 4 presents a server where the information provided according to the user's request is stored.

In difference to well-known networks where a server transmits the information the user is interested in according to his request without conversation, that is the way it is stored in the server, this system allows using the device 3 for



generating a set of requested and advertised information before it is provided to the user.

The memory device (mem) 5 is connected to the entry 6 for inputting advertising information, of said device 3 for generating an information set which may be implemented on a microprocessor, to the information bus (entry 7) of said microprocessor where the requested information is transmitted from the server, to the other entry 6 of said information bus an advertising information is transmitted.

An advertising information can be input using the advertising information memory device. Different modes of input of requested as well as advertising information can be provided using software environment of the microprocessor.

The microprocessor device 3, for instance a microcontroller, for generating a set of information is intended for unifying the user's requested information from mem 4 and advertising information coming from mem 5 or directly from the keyboard. The said device is also intended for generating a mode for transmitting this or that information according to procedures included in the device, i.e.: to allow change of consequence of providing requested information or/and advertising information. The procedures can be the following.

The first element of the information set is advertising, then requested information.

The first element of the information set is represented by a list of different types of advertising or a list of different fields of technique or knowledge about which where is an advertising information provided e.t.c.

The procedure may implement simultaneous presentation if the requested information and advertising etc., as it is shown on Fig.2.

After the advertising information and the requested information have been combined according to the specified procedure, this set is transmitted to its user through the connection set 2 (through a network).

Additionally an advertising information can be input by the user from the keyboard using an input unit (not shown on the figure). If the user has a possibility to choose the advertising he is interested in, the system can work in a mode of a dialog: the user forms a requested information; the information is to be found in mem 4; the message is transmitted through the device 4 informing that the requested information is available, a list of advertising services is then transmitted; the user chooses the advertising service he is interested in, sends the answer to the network and receives a

set of requested information and the type of advertising information according to the user's choice corresponding to the mode of providing information.

The present system may also be implemented as shown on Fig.3 as an inquiry information display board, for instance as a monitor screen or an ordinary display board. In this case the user forms a requested information he is interested in using a key remote control (device 1), the converter (that is not shown in the figure) converts from the remote control input command into the signal corresponding to the object of the request, the connection unit 2 (for instance, a multiplexer) plugs in the necessary memory cell mem 4, where the requested information is stored, the advertising information is then shown simultaneously or before the requested information is presented on a display board of the device 3.

The claimed information system may be used in a wide sphere of information and inquiry-information systems, for it provides presentation of any information the user is interested in, supplying it with an advertising information of any type, thus the system allows changing the mode of providing information. The present system may be implemented using well-known local, wide area networks and communication networks.